that the contents are now partly solid. M. Nélaton thinks that there has been perforation of the vagina, and that through this the liquid part of the tumour has been evacuated, and that there has been at the same time a discharge of blood from the uterus; but he does not think that this discharge has been menstrual, for she menstruated on the 19th of last month, and this discharge commenced on the 7th. But the patient tells me (M. Robin-Massé, the reporter) that for some time the menstrual epoch has continually advanced, and returns about every three weeks.' It is to be remembered that in this case the disease was developed in conjunction with menorrhagia. And at the next return of the menses there was a return of pain, which not only preceded the discharge, but also accompanied it, ceasing when the discharge ceased; whilst in the foregoing account it will be noticed that the pains began to be relieved as soon as the discharge commenced. The only question is, whether the flow in this case was altogether uterine, or partly through a perforation of the vagina. This can now never be decided, as the speculum was not used. It is not like the way in which the fluid is discharged by a perforation of the rectum.

"8. In Voisin's thirty-sixth case there was rapid diminution of the tumour after a discharge, firstly, of serous, and subsequently of sanguinolent fluid. After the discharge had become sanguinolent, M. Voisin examined the patient with the speculum, and found no orifice in the supero-posterior cul-de-sac. The fluid, he says, came from the uterus. The discharge occurred at a non-menstrual period. This case is an illustration of what I have myself seen in two cases—viz., the discharge of a serous fluid, probably, I think, from the cavity of the cyst. But in my cases it occurred when the patients were getting well, and the functions of the peritoneum approached restitution.

"9. In Voisin's twenty-seventh case: 'Sanguineous discharge from vagina; lumbo-sacral pains, intermittent and at times expulsive; death. Fallopian tubes distended with blood, adherent to ovaries, but *communicating* with the cavity of the hæmatocele.'

"*Recapitulation.*—In cases of hæmatocele, we observe a discharge of altered blood, similar to that which flows from a perforation of the rectum, preceded by uterine pains, and seen to flow from the uterus; followed by rapid diminution of the tumour, and increased solidity of it, occurring at a non-menstrual period, the colour and odour of it being dissimilar to those of the menstrual fluid. I submit that we may infer that this fluid comes directly from the cyst into the uterus, into which it probably finds its way through the Fallopian tubes."

63. *Mortality in the Vienna Lying-in Hospital.*—Prof. Spaeth of Vienna has given a sketch of the Lying-in Hospital at Vienna from 1784 to 1863. The hospital was established by Joseph II. in 1784. From 1784 to 1822 it was under the direction of Simon Zeller and J. L. Boër. The number of births during that period were 71,395, and the number of deaths 897; the mortality being about 1.25 per. cent. The epidemics during this period of thirty-seven years were not severe. From 1822 to 1833—the time when the second clinical lying-in department was established—32,336 women were delivered; and of these 1714 died, being a mortality of 5.30 per cent. During these eleven years epidemics were almost constantly present. From 1833 to 1839, Klein and Bartsch directed the hospital; and during this period there were in the first clinique, 12,253 births and 902 deaths, and in the second clinique 9354 births and 620 deaths; consequently, the mortality of women was 7.36 and 6.62 per cent. Puerperal diseases were almost constantly present; but were most fatal in the year 1836–37. During the next period, 1839 to 1847, the management of the two cliniques was altered, the physicians having exclusive charge of the first clinique, and the second clinique being chiefly under the management of midwives. The effect of this change was well marked. The mortality in the second clinique diminished; of 21,155 women confined, 810, or 3.82 per cent., died; whilst under the fearful epidemic of 1842–43, the mortality at the first clinique increased to a terrible height, 2482, or 10.14 per cent., dying, out of 24,455 confined. The greatest mortality occurred in December, 1842, reaching, in fact, to 31.3 per cent. In 1847, Dr. Semmelweiss called attention to the origin of puerperal diseases, through infection from decomposed animal matters, and

took measures for furthering cleanliness; ordering all students to wash their hands in chlorine water before attending the woman. Hereupon, the mortality rapidly diminished; and up to 1849 (when Semmelweiss gave up the direction), of 6589, only 142 died, or 2.15 per cent. At the same time, in the second clinique, the mortality was also low. From this time up to 1864, the mortality has never been so great as in former times; although the hospital has been visited by severe epidemics. In 1854 and 1855, there was a mortality of 9.1 per cent. and 5.4 per cent. in the two cliniques. The last epidemic occurred in the winter of 1861–62, and produced a mortality of 7.7 and 10 per cent.

Professor Spaeth discusses the cause of these visitations. They cannot, he says, be cosmical or telluric; because outside the hospital, in the neighbourhood, no such mortality has occurred. Neither does it appear that these visitations had any connection with epidemics of typhus, scarlatina, measles, etc.; for it often happened that, when these diseases were raging, the Lying-in Hospital was in a healthy condition. For does it appear that cold has any direct influence on the health of puerperal women: and if these diseases are more common in winter, the cause is to be ascribed to the want of opening the windows. For these and other reasons, the professor is convinced that the cause of puerperal epidemics lies in the hospital itself, and that its influence is exerted either during labour or within an hour after its completion. The chief, and probably the sole, agent of puerperal fever is decomposing animal matter, whether arising in the hospital or brought into it from without. The cure for the evil is, therefore, evident; great cleanliness, good ventilation, and separation of the sick from the sound. Semmelweiss was too exclusive in considering that the puerperal fever was caused solely by the infected fingers of the dissecting student.—*British Med. Journ.*, April 30, 1864.

HYGIENE.

64. *Preventive Medicine as Illustrated in the Proper Use of Food.*—[Mr. ERASMUS WILSON read a paper on this subject before the Metropolitan Association of Medical Officers of Health (Dec. 17, 1864). His views are interesting and well worthy of consideration, though we must confess we are not satisfied of the accuracy of all of them. He seems to us to have not taken into account the difference of capacity of stomachs to digest food, the alteration of diet required at different seasons, and he has also, we conceive, underrated the nutritive properties of some articles, as for example rice.—ED. AM. JOURNAL.]

"The subject which I shall endeavour to illustrate is contained in the following propositions: Firstly, that good and sufficient food is necessary to health; and, secondly, that insufficient and inferior food is a fertile source of disease. And, as a deduction from these propositions, applicable to your particular study, I will venture to add, that good and sufficient food is an element of the first importance in the prevention of disease. By food we are to understand that kind of aliment which best conduces to nutrition, growth, and strength; which is capable of producing the most complete development and highest amount of power of the human being; which, in one word, creates health; for in health we have the only trustworthy antagonist of disease. The art and the science of the physician are alike vain, in his combat with disease, unless he can bring about health; and his first and chief aim is to restore health, being fully assured that if he can succeed in renovating health, disease must be extinguished. So, the end and aim of existence of the officer of health may be said to be, to develop the means by which health may be made to occupy the ascendant in the human economy. We have one grand example before us, in which Nature prepares the food of the human being with her own hand, and administers that food at stated periods and according to a prescribed rule. We may ask, What is that food? What are those periods? What is that rule?

"The food is milk; the first food of the newly-born man; an animal food.